22. (New) A magnetic circuit according to claim 20, wherein said magnetic layer is formed by a stack of alternating magnetic and insulating layers.

23. (New) A magnetic circuit according to claim 20, wherein said walls are evenly-spaced.

24. (New) A magnetic circuit comprising a magnetic layer channeling a magnetic field along a given direction, wherein said magnetic layer is broken by gaps perpendicular to said direction.

25. (New) A magnetic circuit according to claim 24, wherein said magnetic layer is a single-layer magnetic layer.

9. 26. (New) A magnetic circuit according to claim 25, wherein said magnetic layer is formed by a stack of alternatively magnetic and insulating layers.

27. (New) A magnetic circuit according to claim 24, wherein said gaps are evenly-spaced.

28. (New) A magnetic circuit comprising a magnetic toroid channeling a magnetic field along a circular direction wherein said toroid is cut by radial gaps.

29. (New) A magnetic circuit comprising a rounded magnetic rear portion and two side magnetic branches, channeling a magnetic field along a certain direction wherein said rear portion and said branches are cut by gaps perpendicular to said direction.

30. (New A process for manufacturing a magnetic circuit for channeling a magnetic field along a given direction, comprising the steps of:

depositing on a substrate a first layer of insulating material;

engraving said first layer by means of a mask having openings, for obtaining pits separated by walls in said insulating material, said walls being perpendicular to said direction;

depositing a magnetic layer in said pits.

- 31. (New) A process according to claim 30, wherein the step of depositing a magnetic layer in said pits comprises depositing a stack of magnetic layers separated by non-magnetic layers.
- 32. (New) A process according to claim 30, wherein the step of depositing a magnetic layer comprises depositing a single-layer, said single-layer filling the pits.
- 33. (New) A process according to claim 30, wherein said step of engraving is carried out by means of a mask having evenly-spaced openings.
- 34. (New) A process for manufacturing a magnetic circuit for channeling a magnetic field along a given direction comprising the steps of:

forming a magnetic layer;

engraving said magnetic layer with gaps, said gaps being perpendicular to said direction.

- 35. (New) A-process according to claim 34, wherein said magnetic layer is a stack of magnetic layers separated by non-magnetic layers.
- 36. (New) A process according to claim 34, wherein said magnetic layer is a single-layer.
- 37 (New) A process according to claim 34, wherein the step of engraving comprises engraving evenly-spaced gaps.--